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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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EXAMINER

PEACHES, RANDY

ART UNIT	PAPER NUMBER
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2686

DATE MAILED: 09/29/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/899,955

Applicant(s)

XANTHOS ET AL.

Examiner

Randy Peaches

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-32 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-32 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. ____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- ☒ Notice of References Cited (PTO-892)
- ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date ____.
- ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. ____.
- ☐ Notice of Informal Patent Application (PTO-152)
- ☐ Other: ____.

DETAILED ACTION

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

1. ***Claims 1-9, 11-28 and 30-32*** are rejected under 35 U.S.C. 103(a) as being unpatentable over Nilsen et al. (U.S. Patent Number 5,987,306) in view of Buchbinder et al. (U.S. Publication Number 2002/0078198 A1).

Regarding ***claim 1***, Nilsen et al. discloses a measuring system for measuring data quality of service on at least one traffic wireless network, comprising:

- a plurality of Mobile Test Units (MTU's), which reads on claimed "remote units", hereinafter referenced interchangeably as "remote device", for performing measurements on the at least one traffic wireless network. See column 2 lines 12-22,
- at least one test mobile, which reads on claimed "test traffic modem", adapted to connect to one or more of the at least one traffic wireless networks. See column 21 lines 19-30 and column 20 lines 5-10 (APPENDIX),
- a built in modem, which reads on claimed "control link modem". See column 20 line 9, and

- a micro-processor, which reads on claimed “control unit”, coupled to the said test mobile and to the said built in modem. see column 2 lines 23-26; and
- a Front End Processor (FE), DBMS and CeNAS (See FIGURE 1), which reads on claimed “back end processor”, for remotely controlling the said MTUs, the said FE, DBMS and CeNAS being in communication with each of the said MTUs via a channel frequency ARFCN, see column 11 lines 32-40, which reads on claimed “control link”, and exchanging commands and responses with the said built in modem via the said ARFCN;

Nilsen et al. fails to specifically and clearly disclose where the respective said MTUs comprise a “*said control link modem*”. However, Nilsen et al. does teach of a built in modem within the architecture of the said MTU. Therefore, the Examiner takes Official Notice that it would have been obvious to one of ordinary skill in the art to perform the modification of internalizing the said modem within the architecture of the said MTU, as it was well known to reduce the number of components in a system by having one component performing multiple functions.

Additionally, Nilsen et al. fails to clearly disclose where the said MTUs are implemented as a WDP client and therefore able to access the network via WAP.

Buchbinder et al. teaches in paragraphs [0011 and 109] where the remote devices e.g. cellphones, PDAs, wireless computers, etc. are WAP devices with built in browser capabilities.

Therefore it would have been obvious to one of ordinary skill in the art to modify the teachings of Nilsen et al. (U.S. Patent Number 5,987,306) to include Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) in order to provide the said remote devices

the functionality to connect with the said Front End Processor (FE), DBMS and CeNAS via a WAP browser.

Regarding *claim 2*, as the combination of Nilsen et al. (U.S. Patent Number 5,987,306) and Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) are made, the combination according to *claim 1*, Nilsen et al. continues to disclose wherein the said test modem is comprised of a Orbitel 901 GSM Digital Phone, which reads on claimed “wireless handset”. See column 20 line 8.

Regarding *claim 3*, as the combination of Nilsen et al. (U.S. Patent Number 5,987,306) and Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) are made, the combination according to *claim 1*, Nilsen et al. continues to disclose wherein said test mobile comprises a wireless modem module. See APPENDIX, column 20 line 9.

Regarding *claims 4, 5 and 6*, as the combination of Nilsen et al. (U.S. Patent Number 5,987,306) and Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) are made, the combination according to *claim 1*, Nilsen et al. continues to disclose in column 8 lines 19-21 wherein the said built in modem (also referenced as “special modems) comprises fixed dial-up lines, which reads on claimed “dedicated phone line and DSL lines”, or ISDN, which reads on claimed “and ISDN line”.

Regarding *claim 7*, as the combination of Nilsen et al. (U.S. Patent Number 5,987,306) and Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) are made, the

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combination according to *claim 1*, Nilsen et al. continues to disclose wherein the WDP client is implemented in the said micro – processor. See column 2 lines 23-26.

Regarding *claim 8*, as the combination of Nilsen et al. (U.S. Patent Number 5,987,306) and Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) are made, the combination according to *claim 1*, Nilsen et al. continues to disclose wherein the WDP client is implemented in the said MTU. See column 2 lines 23-26.

Regarding *claim 9*, as the combination of Nilsen et al. (U.S. Patent Number 5,987,306) and Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) are made, the combination according to *claim 1*, Nilsen et al. fails to disclose wherein the WDP client comprises a WAP browser.

Buchbinder et al. discloses in paragraph [109] wherein the said remote device comprises a WAP browser.

Therefore it would have been obvious to one of ordinary skill in the art to modify the teachings of Nilsen et al. (U.S. Patent Number 5,987,306) to include Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) in order to provide the user the ability to connect to the Internet via a said WAP browser.

Regarding *claim 11*, as the combination of Nilsen et al. (U.S. Patent Number 5,987,306) and Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) are made, the combination according to *claim 1*, Nilsen et al. fails to disclose wherein the said remote device simulates a subscriber using the WDP enabled wireless device.

Buchbinder et al. discloses in paragraph [109] wherein the said remote device simulates a subscriber using the WDP enabled wireless device. Buchbinder et al teaches where a remote device can be WAP devices or PDA devices with built-in browser capabilities.

Therefore it would have been obvious to one of ordinary skill in the art to modify the teachings of Nilsen et al. (U.S. Patent Number 5,987,306) to include Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) to provide remote devices that are able to simulate a WDP client as indicated by Buchbinder et al. in reference to the WAP devices.

Regarding *claims 12-19*, as the combination of Nilsen et al. (U.S. Patent Number 5,987,306) and Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) are made, the combination according to *claim 1*, fails to expressly disclose the variety of modules claimed in the cited application.

However, the Examiner takes Official Notice that it would have been obvious to one of ordinary skill in the art in both the concept and advantages to provide the cited modules as part of the architecture of the said remote devices in order to receive and process the variety of measurement data transmitted using different protocols. Although the combination of Nilsen et al. and Buchbinder et al. does not expressly teach of the cited modules as part of the remote devices architecture, it was obvious and well known in the art that because the said remote device was able to receive different types of information, the said remote device must be equipped with the functionality synonymous to the cited modules in order to perform the tasks.

Regarding *claim 20*, as the combination of Nilsen et al. (U.S. Patent Number 5,987,306) and Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) are made, the combination according to *claim 1*, Nilsen et al. continues to disclose wherein one or more of the said MTUs includes a PSMCIA-based storage, which reads on claimed “database”, providing storage for the measurements. See column 6 lines 13-21.

Regarding *claims 22, 23, and 28*, as the combination of Nilsen et al. (U.S. Patent Number 5,987,306) and Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) are made, the combination according to *claim 1*, Nilsen et al. discloses in column 4 lines 56-58, lines 61-62, where the said Front End Processor (FE), DBMS and CeNAS is capable of issuing orders regarding measurements from not only the said FTUs and the MTUs; but also, from other components defined within the said system.

Consequently, Nilsen et al. fails to specifically and clearly disclose where the said Front End Processor (FE), DBMS and CeNAS includes a scheduler module that schedules the measurements and a data mining module that analyzes the measurements.

Nilsen et al. does teach of wherein the said Front End Processor (FE), DBMS and CeNAS includes processes that are, according to column 4 lines 56-67, requested by a user and/or operator, which involves the function of scheduling the many request for measurement data from the said MTUs, in addition to receiving, processing and presenting the requested measurement data.

Therefore, the Examiner takes Official Notice that it would have been obvious to one of ordinary skill in the art to perform the task of providing a scheduling module within the architecture of the said Front End Processor (FE), DBMS and CeNAS in order

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to facilitate the many requests regarding the function of scheduling and retrieving the measurement data from the said MTUs within the said network.

Regarding *claim 24*, as the combination of Nilsen et al. (U.S. Patent Number 5,987,306) and Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) are made, the combination according to *claim 1*, Nilsen et al. continues to disclose wherein one or more of the fixed terminal unit (FTU) is stationary. See column 2 lines 5-17.

Regarding *claim 25*, as the combination of Nilsen et al. (U.S. Patent Number 5,987,306) and Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) are made, the combination according to *claim 1*, Nilsen et al. continues to disclose wherein one or more of the said MTUs are mobile. See column 2 lines 5-11.

Regarding *claim 26*, as the combination of Nilsen et al. (U.S. Patent Number 5,987,306) and Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) are made, the combination according to *claim 1*, Nilsen et al. continues to disclose wherein the said Front End Processor (FE), DBMS and CeNAS is implemented in a stand-alone configuration. See FIGURE 1.

Regarding *claim 27*, as the combination of Nilsen et al. (U.S. Patent Number 5,987,306) and Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) are made, the combination according to *claim 1*, Nilsen et al. continues to disclose wherein the said

Front End Processor (FE), DBMS and CeNAS is implemented so as to provide command and control of diverse systems beyond the measuring system. See column 4 lines 52-58.

Regarding *claim 32*, Nilsen et al discloses a said Front End Processor (FE), DBMS and CeNAS for measuring data quality of service on at least one traffic wireless network by controlling a plurality of said MTUs that gather data, the back end processor comprising:

- a DBMS, which reads on claimed “fleet database”, providing storage of information concerning the plurality of said MTUs. See column 5 lines 14-22;
- Configuration Station (CS), which reads on claimed “mission schedule database” providing storage of information concerning measurement time, which reads on claimed “missions”, to be carried out by the plurality of said MTUs. See column 6 lines 22-35; and
- a CeNAS, which reads on claimed “fleet management server”, in communication with each of the plurality of MTUs via respective control links and adapted to exchange commands and responses with selected ones of the plurality of said MTUs, the said CeNAS effecting communication with the MTUs based on information accessed from the said DBMS, the commands being based on information accessed from the said CS. See column 5 lines 14-40 and column 6 lines 23-50;

However, Nilsen fails to disclose wherein the said CeNAS is used to issue commands to the said remote devices to simulate an operation of a WDP enable wireless device.

Buchbinder et al. discloses in paragraphs [0109-0110] where a connection server is coupled to the said remote device that allow the said remote device the ability to access the personal server over the Internet.

Therefore, at the time of the invention it would have been obvious to a person of ordinary skilled in the art to modify the teachings of Nilsen et al. (U.S. Patent Number 5,987,306) to include Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) in order to allow the said server the ability to issue a command to the said remote devices, allowing them access to the Internet; which in turn, represents the remote device emulating a WDP client.

2. *Claim 10* is rejected under 35 U.S.C. 103(a) as being unpatentable over the combination of Nilsen et al. (U.S. Patent Number 5,987,306) and Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) in further view of Martin, Jr. et al (U.S. Patent Number 6,363,419 B1).

Regarding *claim 10*, as the above combination of Nilsen et al. (U.S. Patent Number 5,987,306) and Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) are made, the combination according to *claim 1*, fails to disclose wherein the said remote devices supports an iMode browser.

By definition an iMode browser is essentially an interface utilizing a variant of HTML known as "cHTML" or "compact"HTML. Therefore, Martin, Jr. et al. discloses

in column 4 lines 13-30, where cHTML is used on wireless computing devices to display information on a small screen of the said device.

Therefore, at the time of the invention it would have been obvious to a person of ordinary skill in the art to modify the combined teachings of Nilsen et al. (U.S. Patent Number 5,987,306) and Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) to further include Martin, Jr. et al (U.S. Patent Number 6,363,419 B1) to provide a communication protocol capable to allowing information to be displayed on a small screen of the said remote device for browsing and other uses pertaining to the Internet.

3. *Claim 29* is rejected under 35 U.S.C. 103(a) as being unpatentable over the combination of Nilsen et al. (U.S. Patent Number 5,987,306) and Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) in further view of Reeves et al (U.S. Patent Number 5,918,023).

Regarding *claim 29*, as the above combination of Nilsen et al. (U.S. Patent Number 5,987,306) and Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) are made, the combination according to *claim 1*, fails to disclose wherein the said FE is implemented by adapting a pre-existing FE to incorporate a set of added functionalities.

Reeves et al discloses in column 1 lines 25-35, where an existing processor, which reads on claimed "Back end Processor", is ultimately upgraded to a another processor; thus, providing additional functionality to the system. However, it is required that the upgraded processor must meet the existing processor standards prior to the

upgrading procedures, which reads on claimed "by adapting a pre-existing back-end processor".

Therefore, at the time of the invention it would have been obvious to a person of ordinary skill in the art to modify the combined teachings of Nilsen et al. (U.S. Patent Number 5,987,306) and Buchbinder et al. (U.S. Publication Number 2002/0078198 A1) to further include Reeves et al (U.S. Patent Number 5,918,023) to provide an efficient upgrading processing procedure to an existing system in order to eliminate the need of purchasing new equipment each time new features are added.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Randy Peaches whose telephone number is (703) 305-8993. The examiner can normally be reached on Monday - Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Marsha D. Banks-Harold can be reached on (703) 305-4379. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

RP
September 9, 2004

Marsha D. Banks-Harold

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